SUPPLEMENTAL AMENDMENT UNDER 37 C.F.R. § 1.111

USSN: 09/686,760

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

(currently amended) A transmitter assembly including a pre-distortion type linearizer correcting to mutually cancel a distortion component caused in a transmission signal and a correction data component, comprising:

first storage means for preliminarily storing said correction data;

wherein said first storage means manages said correction data as a table per transmission

level and

wherein said transmission level is a sum of an alternating current voltage value

corresponding to an instantaneous power of a transmission signal and a direct current voltage

corresponding to a part of the power of a transmission output signal.

- 2. (canceled).
- 3. (currently amended): A transmitter assembly as set forth in claim 1, which further comprises:

second storage means having a plurality of tables of said correction data per transmission frequency and environmental temperature; and

BAX

means for updating storage content of said first storage means with the corresponding table of said second storage means when at least one of the transmission frequency and the environmental temperature is varied.

4. (currently amended): A distortion compensation method for a transmitter including a pre-distortion type linearizer correcting to mutually cancel a distortion component caused in a transmission signal and a correction data component, comprising steps of:

reading out a value corresponding to a transmission level from a first storage means preliminarily storing said correction data; and

inputting the read out value to said pre-distortion type linearizer;

wherein said first storage means manages said correction data in a form of a table per transmission level; and

wherein said transmission level is a sum of an alternating current voltage value

corresponding to an instantaneous power of a transmission signal and a direct current voltage

corresponding to a part of the power of transmission output signal.

- 5. (canceled).
- 6. (currently amended): A distortion compensation method as set forth in claim 4, wherein a storage content of said first storage means is updated with a corresponding table in said second storage means storing a plurality of tables storing said correction data per

Chory Chory

SUPPLEMENTAL AMENDMENT UNDER 37 C.F.R. § 1.111

USSN: 09/686,760

transmission frequency and environmental temperature when at least one of said transmission frequency and environmental temperature is varied.

- 7. (original) A transmitter assembly as set forth in claim 2, wherein an address corresponding to said transmission level and a correction data/corresponding to said address are stored in said first storage means.
 - 8. (canceled).
- 9. (currently amended): A transmitter assembly as set forth in claim 1, wherein said correction data is consistsed of a predetermined amplitude value and a predetermined phase value of the transmission signal.
- 10. (original): A distortion compensation method as set forth in claim 5, wherein the address corresponding to the transmission level and the correction data corresponding to said address are stored in said first storage means.
 - 11. (canceled).
- 12. (currently amended): A distortion compensation method as set forth in claim 4, wherein said correction data is consistsed of a predetermined amplitude value and a predetermined phase value of the transmission signal.

13. (currently amended): A transmitter assembly including a pre-distortion type linearizer correcting to mutually cancel a distortion component caused in a transmission signal and a correction data component comprising:

transmission signal generating means generating a base band signal of an I signal and a Q signal; and

transmission means modulating and amplifying said base band signal into an RF signal:

and

said pre-distortion type linearizer being provided between an output of said transmission signal generating means and an input of said transmission means; and

directional coupling means dividing RF signal; and

power detecting means detecting said RF signal and outputting a transmission level to address generating means; and

power calculating means calculating an instantaneous Ppower ealculating of said base band signal to output to said address generating means; and

said address generating means detecting an address of data to be output by the a first storage means from said transmission level and said instantaneous power of said base band signal; and

said first storage means for preliminarily storing said correctiong data.

14. (currently amended): A transmitter assembly as set forth in claim 13, wherein said first storage means manages correction data as \underline{a} table per transmission level.

said first

5

SUPPLEMENTAL AMENDMENT UNDER 37 C.F.R. § 1.111

USSN: 09/686,760

15. (currently amended): A transmitter assembly as set forth in claim 13, which further comprises:

second storage means having a plurality of tables of said correction data per transmission frequency and environmental temperature; and

means for updating storage content of said first storage means with the corresponding table of said second storage means when at least one of the transmission frequency and the environmental temperature is varied.

- 16. (original) A transmitter assembly as set forth in claim 14, wherein an address corresponding to said transmission level and a correction data corresponding to said address are stored in said first storage means.
- 17. (original) A transmitter assembly as set forth in claim 14, wherein said transmission level is a sum of an alternating current voltage value corresponding to an instantaneous power of a transmission signal and a direct current voltage corresponding to a part of the power of transmission output signal.
- 18. (currently amended): A transmitter assembly as set forth in claim 13, wherein said correction data is consistsed of a predetermined amplitude value and a predetermined phase value of the transmission signal.

19. (currently amended): A distortion compensation method for a transmitter including a pre-distortion type linearizer correcting to mutually cancel a distortion component caused in a transmission signal and a correction data component, comprising-steps of:

providing said pre-distortion type linearizer between an output of said transmission signal generating means and an input of said a transmission means; and

dividing RF signal by directional counling means; and

detecting said RF signal and outputting a transmission level to address generating means by power detecting means and

calculating an instantaneous power of said a base band signal to output to said address generating means by power calculating means; and

determining an address of data to be output by the a first storage means from said transmission level and said instantaneous power of said base band signal by said address generating means reading out a value corresponding to a transmission level from said first storage means preliminarily storing said correction data; and

inputting the read out value to said pre-distortion type linearizer.

20. (currently amended): A distortion compensation method as set forth in claim 19, wherein said first storage means manages the correction data in a form of <u>a</u> table per transmission level.

- 21. (currently amended): A distortion compensation method as set forth in claim 19, wherein a storage content of said first storage means is updated with a corresponding table in said second storage means storing a plurality of tables storing said correction data per transmission frequency and environmental temperature when at least one of said transmission frequency and environmental temperature is varied.
- 22. (original) A distortion compensation method as set forth in claim 20, wherein the address corresponding to the transmission level and the correction data corresponding to said address are stored in said first storage means.
- 23. (currently amended): A distortion compensation method as set forth in claim 20, wherein said transmission level is a sum of an alternating current voltage value corresponding to an instantaneous power of a transmission signal and a direct current voltage corresponding to a part of the power of a transmission output signal.
- 24. (currently amended): A distortion compensation method as set forth in claim 19, wherein said correction data is consistsed of a predetermined amplitude value and a predetermined phase value of the transmission signal.